

82-#764 - 10763.  
10

SOIL SURVEY  
ON  
OCT #1 AND OCT #2 M.C.  
MAP 93A/11W  
LONGITUDE 121° 25' W  
LATITUDE 52° 35' N  
FOR  
EGIL H. LORNTZSEN

**GEOLOGICAL BRANCH  
ASSESSMENT REPORT**

**10,763**

BY:

CELTIC THREE MINERALS LTD.

AND

LIVGARD CONSULTANTS LTD.

NOVEMBER 4, 1982

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Soil Survey Lead	

INTRODUCTION

A soil survey was carried out under the writer's supervision on part of OCT #1 and OCT #2 mineral claims during the last two weeks of September, 1982 at the request of the owner of the claims, Mr. E. H. Lorntzen.

The objective of the survey was to locate potential gold mineralization using copper and lead trace minerals with which the gold in the area is associated.

SUMMARY

The property consists of three claims and a total of 56 units located 10 miles east of Likely, B.C., north and south of Spanish Lake. The claims cover argillites which occasionally contain quartz and pyrite with gold values.

A grid system was established by flagging lines running 295° Azim and 115° Azim perpendicular to a baseline previously established, running S25°W. The soil horizon was poor due to excessive rubble. The soil samples were analyzed for copper and lead as trace elements.

No anomalous conditions were detected.

PROPERTY

The property consists of three claims named OCT #1 Rec. No. 2071 (10) with 16 units, OCT #2 Rec. No. 2072 (10) with 20 units, and OCT #3 Rec. No. 2073 (10) with 20 units.

The claims are contiguous and cover hillsides on both the north and south sides of Spanish Lake.

The claims are owned by Egil H. Lorntzsen.

LOCATION AND ACCESS

The property lies about 10 km east and south of Likely, B.C. A logging road goes from Likely and along the hillside south of Spanish Lake crossing the claims. Another road extends from the logging road down to Spanish Lake. The North part of the claims (mainly OCT #3), which was not surveyed, can be reached from the end of a road at the west end of Spanish Lake through very dense bush over one to four km or by boat across Spanish Lake.

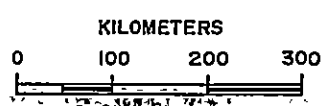


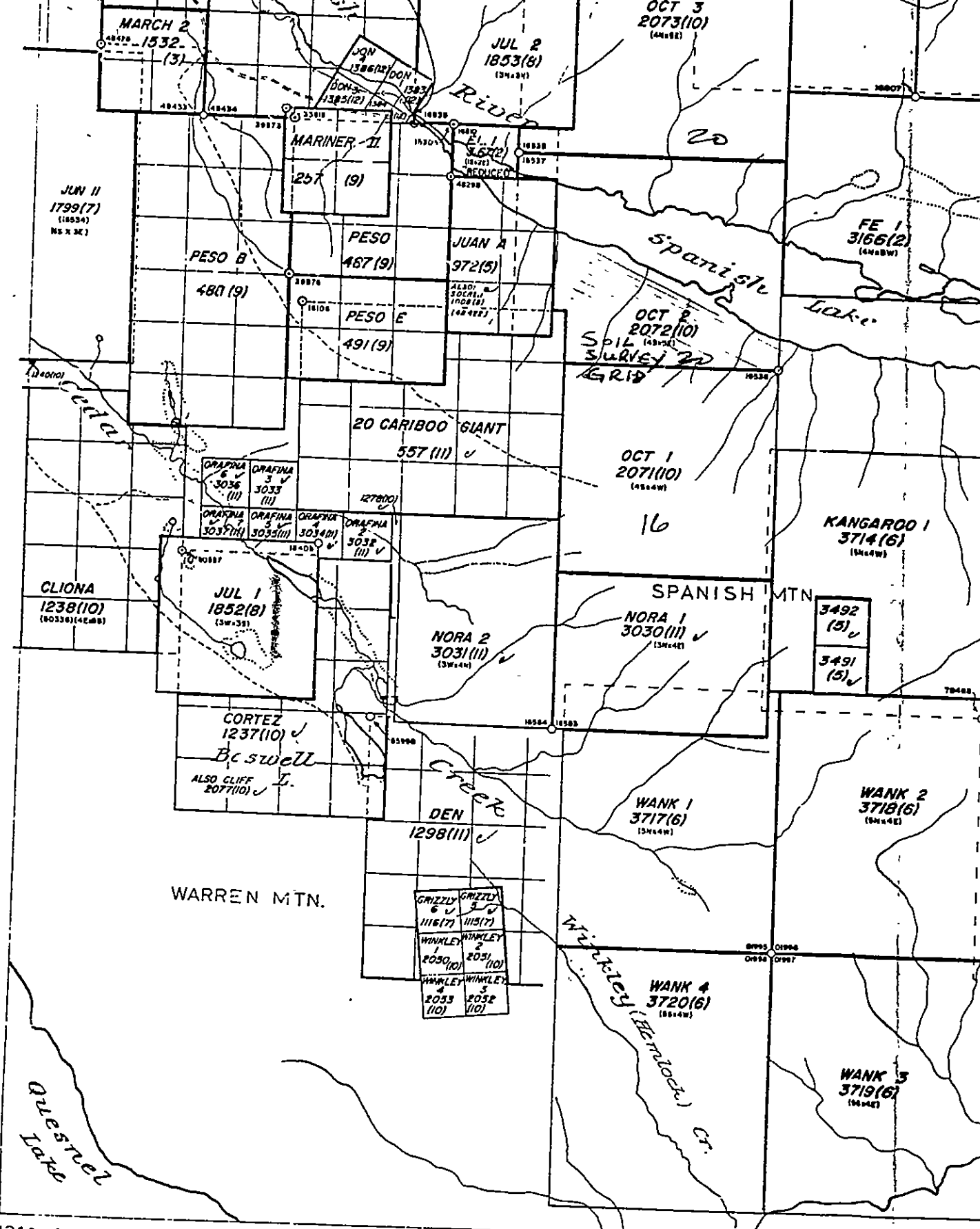
OCT CLAIM GROUP

SPANISH LAKE

LIKELY, B.C.

LOCATION MAP





52°30'

121°30' CARIBOO MINING DIVISION

TO SOUTH SEE MAP

M 93A/11W

DEPARTMENT OF MINES AND PET  
VICTORIA, B.C.

For up-to-date information  
on claims in any area you  
should apply to the Mining  
Recorder for the Mining

0 1000m 2 3km  
1:50000

TOPOGRAPHY AND CLIMATE

The north and south hillsides from Spanish Lake are of moderate slope. The area has relatively high precipitation of about 750 mm, of which 1,880 mm is snow.

Because of the high precipitation, the growth is heavy, causing hard working conditions.



GEOLOGY

The claim area covers argillites and phyllites with minor quartzite of Upper Triassic age.

The rocks strike north westerly and dip NE and SW. An anticlinal structure is probable on the northern part of the claims.

Quartz veins containing galena and tetrahedrite have been noted.

SOIL SURVEY

Grid System

A grid system was established using a suunto compass and "hip chain". The baseline was started close to the centre of claim OCT #2 about 150 m south of Spanish Lake. The baseline extended 500 m in S 25° W direction.

The survey lines run at right angle to the base line in N 65° W direction named NW and S 65° E direction named SE.

The first five lines are spaced 50 m apart and the next three lines 100 m apart. The lines are marked with red flagging.

The stations were marked every 50 m with two colours of flagging and the station number marked on the flagging.

Soil Sampling

A weak soil horizon was noted. The soil horizon was frequently disrupted by a large amount of rubble. The rubble was of local origin - apparently from relatively rapid soil creep. It was often difficult to get sufficient fine material for a sample.

Soil Sampling (cont)

The B horizon was sampled when it could be recognized, otherwise the sample was taken about four inches below the organic layer.

A sample was taken at each station 50 m apart. The samples were placed in a kraft sample bag and the bag marked with the station number.

Sample Analysis

The samples were analyzed by general testing laboratories. The samples were dried and screened to minus 80 mesh. A one gram sample was taken. The samples were leached with aqua regia 10 mill nitric and five mill hydrochloric almost to dryness and re-dissolved using 5% 20 mill hydrochloric acid. Analysis was made using atomic absorption spectro photometer.

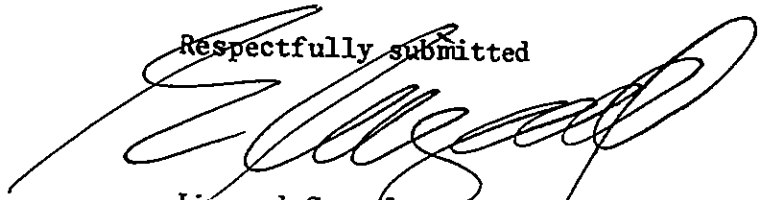
ANOMALOUS CONDITIONS

Frequency histograms show symmetric normal curves for both copper and lead, indicating no anomalous conditions.

Examination of the map of plotted copper values show a few high copper values clustered in two areas - on lines 100 SW, 150 SW and 200 SW from 550 NW to 950 NW and also on lines 400 SW and 500 SW from 200 SE to 350 SE.

These two areas will be further examined by running the soils samples here for gold.

Respectfully submitted



Livgard Consultants Ltd.  
E. Livgard, BSc., P. Eng.

STATEMENT OF QUALIFICATIONS OF SURVEY PERSONNEL

Dag Livgard	4th year UBC student. Mineral exploration experience: Four summer seasons of Grid-systems, soil surveys and geological helper with Livgard Consultants Ltd. One season - last year on two large magnetic surveys.
Bryan Livgard	2nd year UBC student in geology. Mineral exploration experience: Two seasons with Rio Algom Regional Exploration, soil surveys and claim staking in the Rocky Mtn. Trench. Two seasons with Livgard Consultants Ltd. doing grids and soil surveys. One season - last year, on two large magnetic surveys.
Paul Livgard	Two seasons of grid and soil survey helper.
Nat Lemmon	No experience

COST DECLARATION

Survey Contract by Celtic Three Minerals Ltd.

14.7 km @ \$200.00 \$ 2,940.00

Analysis for Cu and Pb 925.00

Report and Supervision - 3 Days @ \$240.00 720.00


All expenses 240.00

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\$ 4,825.00  

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Egil Livgard, BCs, P. Eng.



TO:  
 LIVGARD CONSULTANTS LTD.  
 1990 King Albert  
 Coquitlam, B.C.  
 V3J 1Z2

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 A Division of SGS Supervision Services Inc.

1001 EAST PENDER ST., VANCOUVER, B.C., CANADA, V6A 1W2  
 PHONE (604) 254-1647 TELEX 04-507514 CABLE SUPERVISE

**CERTIFICATE OF ASSAY**

No.: 8209-0950      DATE: Sept. 22/82

We hereby certify that the following are the results of assays on: **Soil samples**

MARKED	<del>XXXXXXXXXXXX</del>		Copper	Lead	xxx	Sample	Copper	Lead
			Cu (ppm)	Pb (ppm)		Marked:	Cu (ppm)	Pb (ppm)
BL 0+00 SW			27 <sup>✓</sup>	13 <sup>✓</sup>		<u>0+50 SW</u>		
<u>0+00 SW</u>						3+00 NW	65 <sup>✓</sup>	13 <sup>✓</sup>
0+50 NW			25 <sup>✓</sup>	9 <sup>✓</sup>		3+50	211	16 <sup>✓</sup>
1+00			18 <sup>✓</sup>	8 <sup>✓</sup>		4+00	41 <sup>✓</sup>	13 <sup>✓</sup>
1+50			54 <sup>✓</sup>	17 <sup>✓</sup>		4+50	73 <sup>✓</sup>	15 <sup>✓</sup>
2+00			41 <sup>✓</sup>	7 <sup>✓</sup>		5+00	71 <sup>✓</sup>	10 <sup>✓</sup>
2+50			26 <sup>✓</sup>	3 <sup>✓</sup>		5+50	81 <sup>✓</sup>	75
3+00			160 <sup>✓</sup>	12 <sup>✓</sup>		6+00	88 <sup>✓</sup>	18 <sup>✓</sup>
3+50			25 <sup>✓</sup>	8 <sup>✓</sup>		6+50	24 <sup>✓</sup>	7 <sup>✓</sup>
4+00			24 <sup>✓</sup>	7 <sup>✓</sup>		7+00	34 <sup>✓</sup>	7 <sup>✓</sup>
4+50			12 <sup>✓</sup>	7 <sup>✓</sup>		7+50	47 <sup>✓</sup>	8 <sup>✓</sup>
5+00			25 <sup>✓</sup>	10 <sup>✓</sup>		8+00	82 <sup>✓</sup>	11 <sup>✓</sup>
5+50			47 <sup>✓</sup>	11 <sup>✓</sup>		8+50	22 <sup>✓</sup>	7 <sup>✓</sup>
6+00			36 <sup>✓</sup>	15 <sup>✓</sup>		9+00	80 <sup>✓</sup>	16 <sup>✓</sup>
6+50			31 <sup>✓</sup>	9 <sup>✓</sup>		9+50	35 <sup>✓</sup>	9 <sup>✓</sup>
7+00			58 <sup>✓</sup>	13 <sup>✓</sup>		10+00	47 <sup>✓</sup>	11 <sup>✓</sup>
7+50			76 <sup>✓</sup>	11 <sup>✓</sup>		BL 0+50SW	35 <sup>✓</sup>	8 <sup>✓</sup>
8+00			29 <sup>✓</sup>	8 <sup>✓</sup>		<u>0+50 SW</u>		
8+50			37 <sup>✓</sup>	8 <sup>✓</sup>		0+50 SE	28 <sup>✓</sup>	7 <sup>✓</sup>
9+00			149 <sup>✓</sup>	18 <sup>✓</sup>		1+00	22 <sup>✓</sup>	8 <sup>✓</sup>
9+50			56 <sup>✓</sup>	16 <sup>✓</sup>		1+50	26 <sup>✓</sup>	10 <sup>✓</sup>
10+00			45 <sup>✓</sup>	8 <sup>✓</sup>		2+00	46 <sup>✓</sup>	10 <sup>✓</sup>
0+50 SE			23 <sup>✓</sup>	7 <sup>✓</sup>		2+50	25 <sup>✓</sup>	15 <sup>✓</sup>
1+00			17 <sup>✓</sup>	5 <sup>✓</sup>		3+00	42 <sup>✓</sup>	11 <sup>✓</sup>
1+50			56 <sup>✓</sup>	30 <sup>✓</sup>		3+50	27 <sup>✓</sup>	11 <sup>✓</sup>
2+00			32 <sup>✓</sup>	13 <sup>✓</sup>		4+00	25 <sup>✓</sup>	10 <sup>✓</sup>
2+50			84 <sup>✓</sup>	26 <sup>✓</sup>		4+50	54 <sup>✓</sup>	10 <sup>✓</sup>
3+00			69 <sup>✓</sup>	28 <sup>✓</sup>		5+00	32 <sup>✓</sup>	8 <sup>✓</sup>
<u>0+50 SW</u>						5+50	49 <sup>✓</sup>	11 <sup>✓</sup>
0+50 NW			40 <sup>✓</sup>	10 <sup>✓</sup>		6+00	69 <sup>✓</sup>	15 <sup>✓</sup>
1+00			35 <sup>✓</sup>	13 <sup>✓</sup>		6+50	96 <sup>✓</sup>	22 <sup>✓</sup>
1+50			52 <sup>✓</sup>	10 <sup>✓</sup>		7+00	65 <sup>✓</sup>	15 <sup>✓</sup>
2+00			49 <sup>✓</sup>	10 <sup>✓</sup>				
2+50			77 <sup>✓</sup>	10 <sup>✓</sup>				

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P. Buschlen, Chemist

~~PROVINCIAL ASSAYER~~

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TO:  
**LIVGARD CONSULTANTS LTD.**  
 ..... page 2 .....

## CERTIFICATE OF ASSAY

No.: 8209-0950      DATE: Sept. 22/82

We hereby certify that the following are the results of assays on:      Soil samples

MARKED	Copper		Lead		xxx	Sample Marked:	Copper		Lead	
	Cu (ppm)	Pb (ppm)	Cu (ppm)	Pb (ppm)			Cu (ppm)	Pb (ppm)		
<u>0+50 SW</u>						<u>100 SW</u>				
7+50 SE	66✓	16✓	400 SE	43✓	13✓					
8+00	79✓	11✓	450	21✓	7✓					
8+50	36✓	10✓	500	25✓	6✓					
9+00	51✓	15✓	550	44✓	8✓					
9+50	31✓	10✓	600	51✓	10✓					
10+00	79✓	33✓	650	38✓	5✓					
			700	48✓	7✓					
<u>100 SW</u>			750	38✓	10✓					
BL	49✓	13✓	800	44✓	13✓					
0+50 NW	25✓	8✓	850	53✓	11✓					
100	53✓	11✓	900	100✓	20✓					
150	50✓	13✓	950	47✓	13✓					
200	101✓	11✓	1000	100✓	16✓					
250	67✓	15✓								
300	89✓	11✓	<u>150 SW</u>							
350	25✓	10✓	BL	42✓	8✓					
400	59✓	15✓	50 NW	26✓	8✓					
450	42✓	25✓	100	85✓	20✓					
500	28✓	13✓	150	85✓	15✓					
550	118✓	20✓	200	67✓	7✓					
600	59✓	10✓	250	65✓	10✓					
650	30✓	7✓	300	127✓	8✓					
700	52✓	8✓	350	72✓	8✓					
750	165✓	6✓	400	74✓	8✓					
800	22✓	7✓	450	59✓	10✓					
850	24✓	7✓	500	59✓	13✓					
900	70✓	8✓	550	81✓	11✓					
950	58✓	16✓	600	114✓	181					
1000	76✓	11✓	650	24✓	7✓					
			700	66✓	7✓					
50 SE	58✓	11✓	750	262	22✓					
100	114✓	18✓	800	98✓	20✓					
150	49✓	10✓								
200	46✓	11✓								
250	89✓	5✓								
300	133✓	33✓								
350	39✓	8✓								

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P. Buschlen, Chemist

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			Cu (ppm)	Pb (ppm)			Cu (ppm)	Pb (ppm)
<u>150 SW</u>						<u>200 SW</u>		
850 NW	✓		250	33 ✓		600 NW	81 ✓	13 ✓
900	✓		141 ✓	26 ✓		650	36 ✓	10 ✓
950	✓		126 ✓	25 ✓		700	60 ✓	15 ✓
1000	✓		72 ✓	15 ✓		750	146 ✓	36
						800	50 ✓	13 ✓
0+50 SE			66 ✓	11 ✓		850	40 ✓	10 ✓
100			18 ✓	7 ✓		900	56 ✓	15 ✓
150			25 ✓	8 ✓		950	55 ✓	13 ✓
200			30 ✓	10 ✓		1000	81 ✓	16 ✓
250			25 ✓	8 ✓				
300			91 ✓	11 ✓	✓	50 SE	373	25 ✓
350			106 ✓	11 ✓	✓	100	65 ✓	13 ✓
400			17 ✓	6 ✓	✓	150	30 ✓	7 ✓
450			42 ✓	15 ✓		200	37 ✓	10 ✓
500			18 ✓	7 ✓		250	36 ✓	10 ✓
550			45 ✓	7 ✓		300	19 ✓	8 ✓
600			23 ✓	6 ✓		350	48 ✓	11 ✓
650			66 ✓	10 ✓		400	56 ✓	16 ✓
700			26 ✓	6 ✓		450	42 ✓	10 ✓
750			24 ✓	6 ✓		500	22 ✓	8 ✓
800			25 ✓	7 ✓		550	29 ✓	11 ✓
850			18 ✓	8 ✓		600	57 ✓	10 ✓
900			32 ✓	7 ✓		650	54 ✓	16 ✓
950			54 ✓	10 ✓		700	60 ✓	13 ✓
1000			48 ✓	8 ✓		750	45 ✓	11 ✓
						800	35 ✓	8 ✓
<u>200 SW</u>						850	63 ✓	11 ✓
00 NW			43 ✓	8 ✓		900	53 ✓	13 ✓
50			65 ✓	10 ✓		950	17 ✓	5 ✓
150			69 ✓	11 ✓		1000	71 ✓	11 ✓
250			67 ✓	15 ✓				
300			106 ✓	10 ✓				
350			40 ✓	7 ✓				
400			51 ✓	10 ✓				
450			26 ✓	8 ✓				
500			45 ✓	7 ✓				
550		✓	114 ✓	105				

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**P. Buschlen, Chemist**

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			Cu (ppm)	Pb (ppm)		Marked:	Cu (ppm)	Pb (ppm)
<u>300 SW</u>						<u>400 SW</u>		
00 NW			42 ✓	13 ✓		200 NW	55 ✓	13 ✓
50			100 ✓	15 ✓		250	74 ✓	16 ✓
100			74 ✓	15 ✓		300	52 ✓	13 ✓
150			97 ✓	15 ✓		350	61 ✓	10 ✓
200			59 ✓	13 ✓		400	62 ✓	11 ✓
250			91 ✓	16 ✓		450	38 ✓	10 ✓
300			51 ✓	10 ✓		500	52 ✓	18 ✓
350			63 ✓	13 ✓		550	16 ✓	5 ✓
400			196	18 ✓		600	37 ✓	13 ✓
450			25 ✓	8 ✓		650	62 ✓	13 ✓
500			52 ✓	11 ✓		700	57 ✓	15 ✓
550			57 ✓	11 ✓		750	110 ✓	20 ✓
600			37 ✓	18 ✓		800	32 ✓	10 ✓
650			48 ✓	13 ✓		850	47 ✓	7 ✓
700			40 ✓	13 ✓		900	46 ✓	13 ✓
750			86 ✓	20 ✓		950	26 ✓	8 ✓
800			70 ✓	11 ✓		1000	30 ✓	11 ✓
850			29 ✓	15 ✓				
900			72 ✓	16 ✓		50 SE	74 ✓	16 ✓
950			70 ✓	16 ✓		100	97 ✓	18 ✓
1000			66 ✓	15 ✓		150	81 ✓	20 ✓
						200	52 ✓	20 ✓
50 SE			75 ✓	16 ✓	✓	250	189 ✓	35 ✓
100			69 ✓	18 ✓	✓	300	102 ✓	25 ✓
150			60 ✓	11 ✓	✓	350	48 ✓	18 ✓
200			61 ✓	16 ✓		400	38 ✓	35 ✓
250			50 ✓	13 ✓		450	30 ✓	16 ✓
300			56 ✓	15 ✓		500	60 ✓	22 ✓
350			49 ✓	16 ✓		550	61 ✓	13 ✓
400			110 ✓	18 ✓		600	37 ✓	11 ✓
<u>400 SW</u>						650	69 ✓	20 ✓
00 NW			92 ✓	20 ✓		700	31 ✓	16 ✓
50			48 ✓	20 ✓		750	72 ✓	16 ✓
100			56 ✓	13 ✓		800	63 ✓	20 ✓
150			46 ✓	13 ✓				

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**P. Buschlen, Chemist**

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MARKED	<del>XXXXXXXXXXXX</del>		Copper	Lead	<del>XXXX</del>	Sample	Copper	Lead
			Cu (ppm)	Pb (ppm)		Marked:	Cu (ppm)	Pb (ppm)
<u>400 SW</u>						<u>500 SW</u>		
850 SE			55 L	24 L		✓ 350 SE	129 ✓	26 ✓
900			49 L	20 L		✓ 400	92 ✓	20 L
950			30 L	11 L		✓ 450	46 ✓	13 ✓
1000			29 L	10 L		✓ 500	92 ✓	15 ✓
<u>500 SW</u>						550	37 L	19 L
0+00 NW			24 L	15 L		600	73 L	20 L
50			54 L	20 L		650	74 L	21 L
100			60 L	15 L		700	90 L	20 L
150			38 L	13 L		750	23 L	17 L
200			75 L	16 L		800	96 ✓	18 L
250			56 L	15 L		850	64 L	24 L
300			36 L	13 L		900	49 L	20 L
350			61 L	11 L		950	29 L	15 L
400			90 ✓	36		1000	70 L	22 L
450			78 L	18 L				
500			49 L	11 L				
550			46 L	13 L				
600			60 L	15 L				
650			100 ✓	15 L				
700			74 L	16 L				
750			60 L	16 L				
800			59 L	10 L				
850			182	11 L				
900			23 L	6 L				
950			45 L	7 L				
1000			49 L	8 L				
50 SE			38 L	12 L				
100			24 L	10 L				
150			23 L	10 L				
✓ 200			142 L	21 L				
✓ 250			43 L	16 L				
✓ 300			94 L	23 L				

NOTE: REJECTS RETAINED ONE MONTH PULPS RETAINED THREE MONTHS ON REQUEST PULPS AND REJECTS WILL BE STORE FOR A MAXIMUM OF ONE YEAR

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P. Buschlen, Chemist

Analytical and Consulting Chemists, Bulk Cargo Specialists, Surveyors, Inspectors, Samplers, Weighers

MEMBER, American Society For Testing Materials • The American Oil Chemists Society • Canadian Testing Association  
 REFEREE AND OR OFFICIAL CHEMISTS FOR National Institute of Oilseed Products • The American Oil Chemists' Society  
 OFFICIAL WEIGHMASTERS FOR Vancouver Board Of Trade

LIVGARD CONSULTANTS LTD.

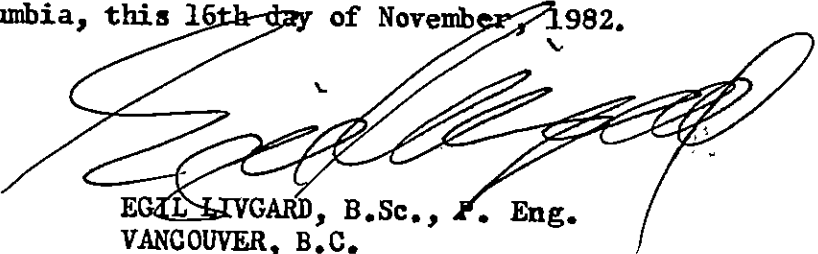
VANCOUVER, B.C.

CERTIFICATE

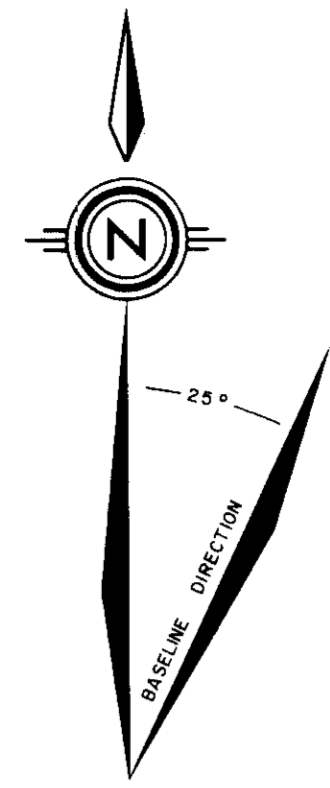
I, Egil Livgard, of 1990 King Albert Avenue, Coquitlam, British Columbia, do hereby certify that:

- 1) I am a consulting geological engineer.
- 2) I am a graduate of the University of British Columbia, B. Sc., 1960, Geological Sciences.
- 3) I am a member of the Association of Professional Engineers of the Province of British Columbia.
- 4) From 1960 to 1970 I was engaged in mining and exploration geology in Canada and Norway for various companies, and since that time I have been a consultant to the Mining Industry in B. C.
- 5) My report is based on a personal examination of the property and on information compiled on the area, and other material as referred to in the report.
- 6) I have no direct or indirect interest in the property described herein.

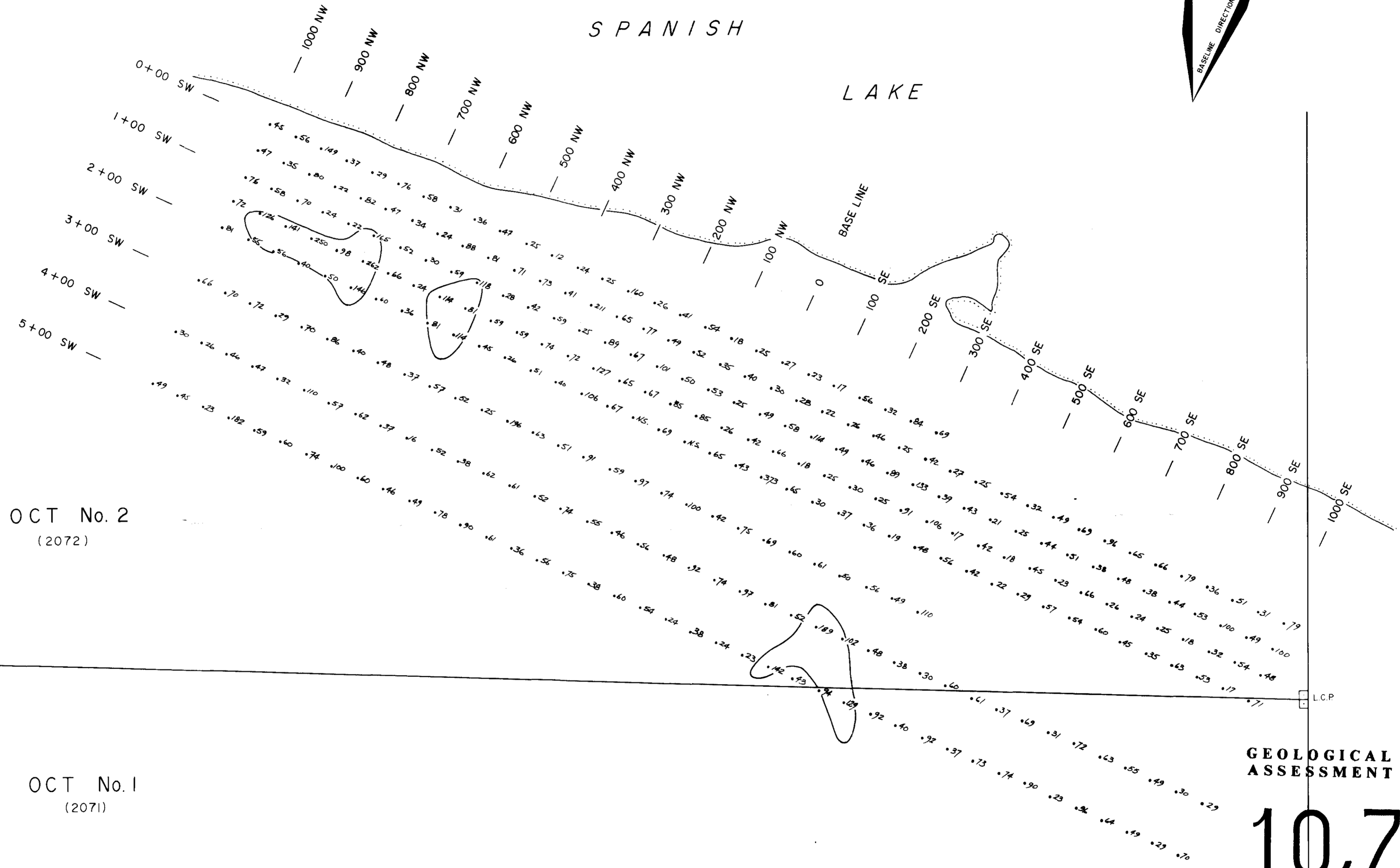
DATED at Vancouver, British Columbia, this 16th day of November, 1982.



EGIL LIVGARD, B.Sc., P. Eng.  
VANCOUVER, B.C.



SPANISH LAKE



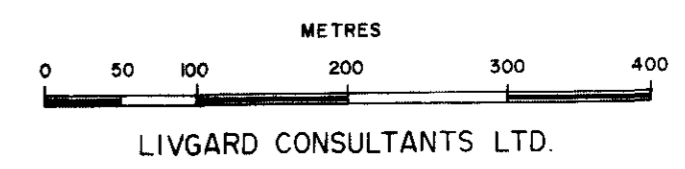
OCT No. 2  
(2072)

OCT No. 1  
(2071)

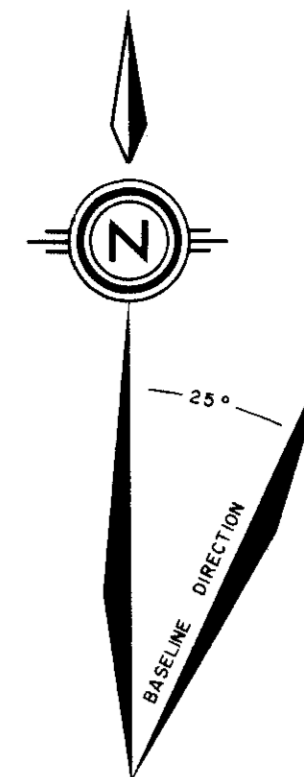
GEOLOGICAL BRANCH  
ASSESSMENT REPORT

10,763

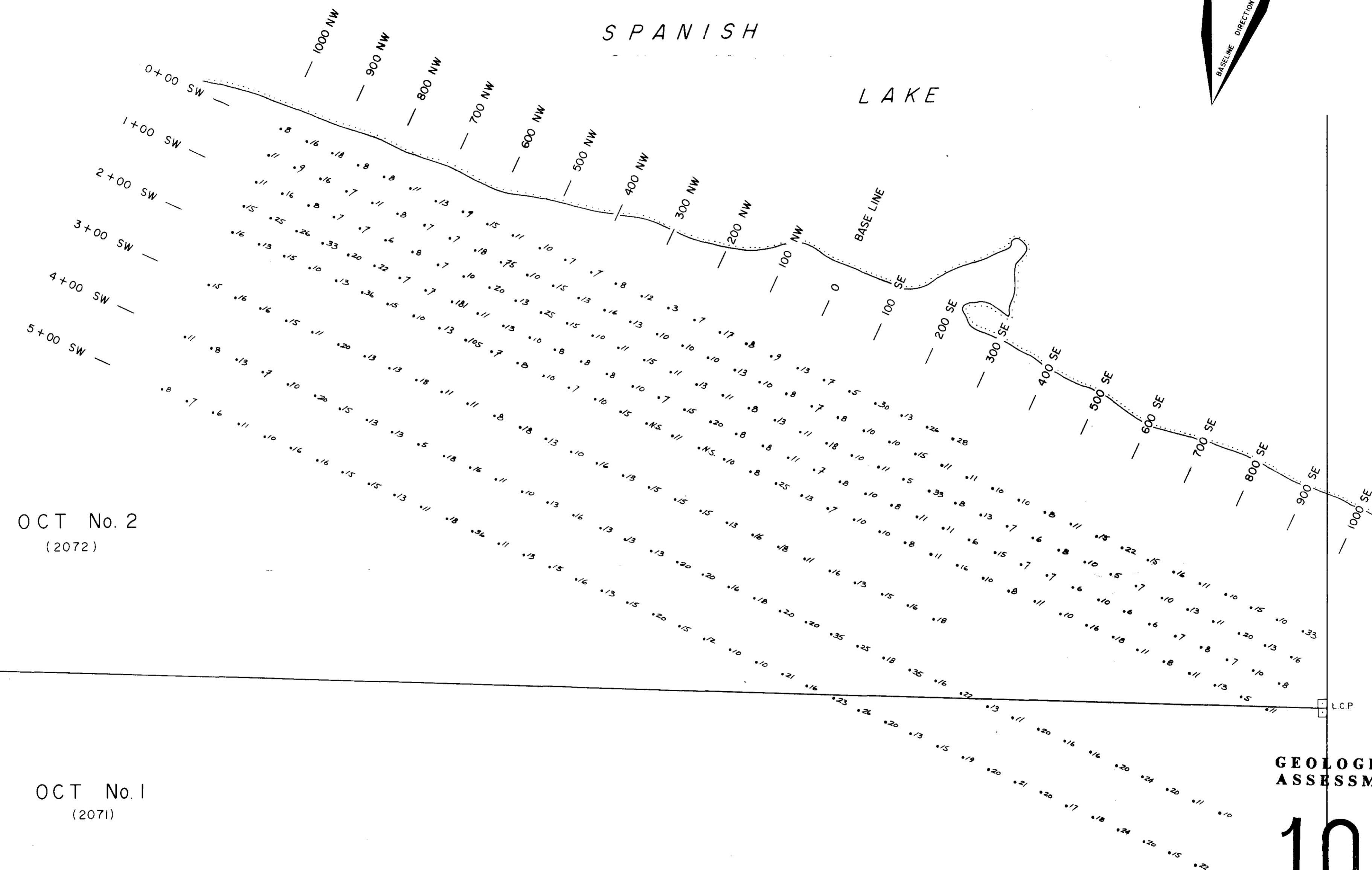
OCT CLAIM GROUP  
SPANISH LAKE  
LIKELY, B.C.  
GEOCHEMICAL SURVEY  
COPPER IN PPM



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(2072)

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(2071)

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10,763

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LIKELY, BC.  
GEOCHEMICAL SURVEY  
LEAD IN PPM

